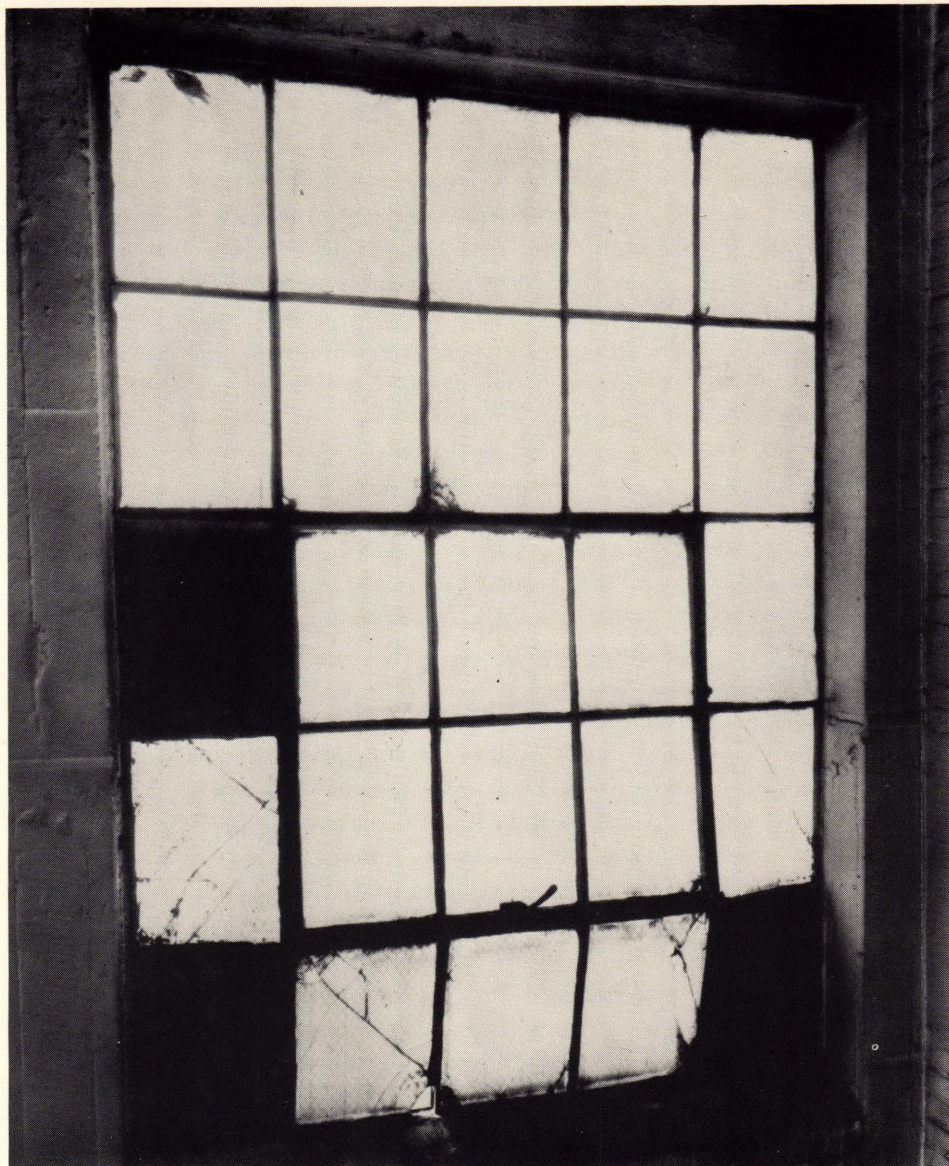


new jersey
Architecture



April/May/June 1978



We saved more than this window, we saved energy, too!

... and we have saved literally thousands upon thousands of similarly unsightly, heat-robbing and non-functioning steel and aluminum framed windows during the past thirty-odd years. We also specialize in replacement of old wooden windows with modern steel or aluminum windows available in a full variety of designs to meet your particular structural and decor requirements.

No job is too big! We have made and are in the process of completing installations in multi-storied skyscrapers, sprawling industrial complexes, warehouses, and institutions — all over the country.

Extra reliability and endurance built-in to a Steel Sash Service installation costs no more. Our experienced, trained crews handle the complete job — including glass replacement, glazing and painting — with dispatch and minimum inconvenience to your operation and personnel.

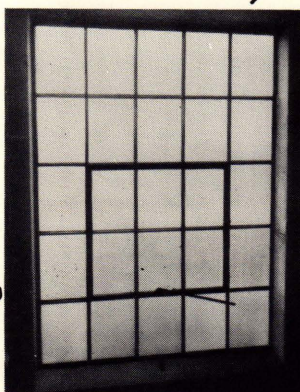
STEEL SASH SERVICE™

Div. of COLLYER ASSOCIATES, INC.

30 EAST 33rd ST., N.Y., N.Y. 10016 (212) 684-0900

Specialists in Window Renovation and Replacement • Exterior Metal Refacing

*Go with the experts!
Call direct, or mail coupon today
for prompt action.
No obligation of course.*



STEEL SASH SERVICE™
Div. of COLLYER ASSOCIATES, INC.

**SAVE MY WINDOWS...
AND ENERGY TOO!**

No. of Windows _____

☐ STEEL ☐ ALUMINUM ☐ WOOD

Name _____

Firm _____

Street _____

City _____ State _____ Zip _____

CLAREMONT

PAINTING AND DECORATING CO., INC.

CLAREMONT PAINTING & DECORATING CO., INC.

*Vinyl Wall Covering, Epoxy Coating, Spray Painting, Tanks,
Water Towers, Steam Cleaning,
Sandblasting, Maintenance Painting*

Box 5 • Rt. 202 • Bedminster, N.J. 07921

DOMINIC SCIARETTA, President

Phone 201-234-1600

CLAREMONT WALL SYSTEMS, INC.

Metal Stud and Drywall Partitions — Custom Carpentry
Acoustical Ceilings — Movable Partitions

VAUGHAN WALLS MOVABLE PARTITION SYSTEM

Completely Movable and Reusable — Free Standing
Simple Utility Line Installation

John Jastrabek • 201-234-2422

"REPLACEMENT WINDOWS"

DeVAC stops heat loss... cold.

Problem:

Energy supplies are critically decreasing. Energy prices are drastically increasing. And your building's windows are losing heat in the fall and winter and losing air conditioning in the spring and summer.

Solution:

Your building needs DeVAC Thermo-Barrier aluminum windows. They'll not only reduce heating and cooling costs, but original equipment costs as well.

In the northern zone, the heat transfer of ordinary double-glazed windows is 113 BTU's. Compare this to the heat transfer of just 44 BTU's with a DeVAC Thermo-Barrier window. (Certified calculations available on request.)

DeVAC Thermo-Barrier aluminum win-

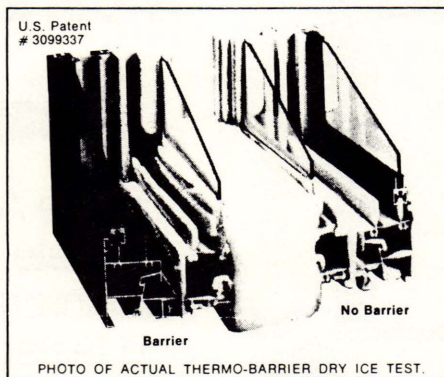


DIAGRAM OF DeVAC's PATENTED NON-STRUCTURAL THERMO-BARRIER FRAME

1. High impact rigid vinyl. 1/875th the heat flow of aluminum.
2. Inner and outer frame members expand and contract independently.
3. Factory assembled, sealed, protected from ultra-violet rays.

DeVAC Thermo-Barrier windows provide an insulating air space of 2 inches between the inner and outer glass panes. This generous air space is a significantly more effective heat transfer barrier than the fractional-inch air spaces found in ordinary "insulated" glass designs.

dows are unconditionally guaranteed for 10 years. No tear-out, re-plastering or re-painting of the building is required. An additional advantage offered by DeVAC windows is speed of installation. DeVAC has installed window systems in numerous hospitals, hotels, schools and other buildings with little or no downtime incurred on room occupancy.

For a free sample DeVAC Thermo-Barrier window and installation, write now. Right now!

DeVAC stops heat loss... cold.



We've made a science of making windows.

WINDOW SYSTEMS, INC.

P.O. BOX 1111-R, Morristown, N.J.

201-538-1234

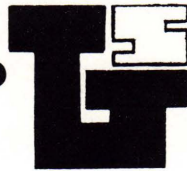
PROFESSIONAL LIABILITY INSURANCE

AS BROKERS WE WORK FOR YOU AND THE SOCIETY
QUOTATIONS FROM ALL MARKETS LICENSED IN NEW JERSEY
(ADMITTED AND SURPLUS LINES INSURERS — KNOW THE DIFFERENCE)

PRICE OR BENEFITS

KNOW THE ANSWERS BEFORE YOU BUY OR CHANGE

**THOMAS J. SHARP
& ASSOCIATES**



POST OFFICE BOX 4037
46 CASALE DR. WARREN, N.J. 07060

201-647-5003

SERVING NJSA OVER A DECADE — WE KNOW YOUR NEEDS



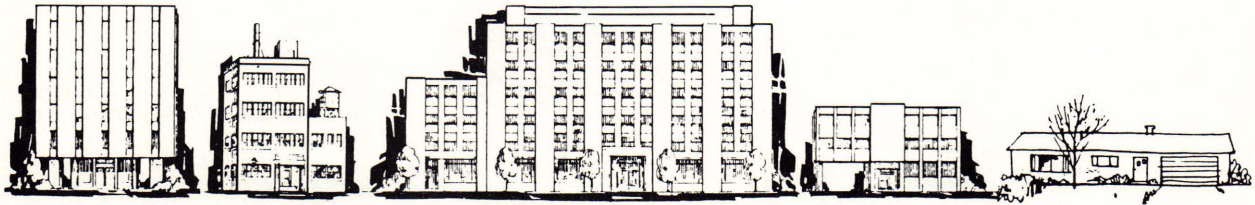
Entrances, Storefronts & Curtain Wall Systems by Amarlite Anaconda

Amarlite Anaconda offers a complete line of Architectural Aluminum Products, designed and tested to meet the demands of today's architectural needs, including a line up of thermally improved glazing systems.

Write or call the Amarlite Anaconda Distribution Center in your area today for assistance.

Phone: 201-262-1540
50 West Century Rd • Paramus, N.J. 07652

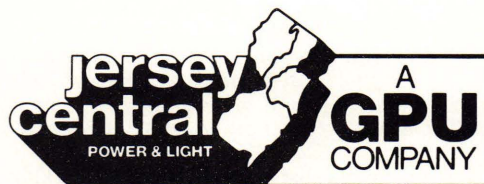
**Energy Management
Through
Energy Efficient Building Design:
a Key to Our Country's Future!**



**Today's
Architectural and Engineering
Challenge:**

To design and build structures to meet customers' needs now and in the future that will help our country win the energy race.

**Energy is a Valuable Resource!
Build in Energy Efficiency**



Official Publication of
NEW JERSEY SOCIETY OF ARCHITECTS

A Region of The American Institute of Architects
110 Halsted Street, East Orange, NJ 07018
(201) 672-7900-7901-7310

BOARD OF DIRECTORS

President	J. Robert Gilchrist
President-Elect	Romeo Aybar
Vice President	Leo H. Mahony
Vice President	Paul J. DeMassi
Treasurer	Peter A. Pizzi
Secretary	Herman H. Bouman
Past President	Richard Bottelli

Architects League of
Northern N.J.

D. Levon Gedickian
Joseph A. Cecco
S. Vincent D'Amore
John A. DeBrulye
Edward A. Levy
*Michael T. Callori
*Jon C. Fellgraff
*William Houthuysen
*Dennis A. Mylan
*Concezio Petrella

Central

David M. Pease
Allan M. Blauth
Arthur M. Emerson
Jamil E. Faridy
Tylman R. Moon
Philip Post
*Mark A. Berkowsky
*Roland W. Diez
*Joseph J. Malloy
*Adolph R. Scrimenti, FAIA

Newark/Suburban

Edward J. Centanni
James G. Centanni
Calvin M. Colabella
Leo L. Fischer
Salvatore M. Guzzo
*Peter A. Carlson
*Jaime V. Martins
*Frederic A. Rosen
*Gerald F. Schaefer

Shore

Frank J. Tomaino, Jr.
Robert E. Cook
M. David Rodetsky
*Daniel L. Bach
*Robert F. DeSantis
*David Manner

South Jersey

Clement F. Wasleski

West Jersey

J. Gordon Nilsen
Martin C. Conrad
Norman G. Morrell
*Joseph R. Borda

Past Presidents

Arthur Rigolo, FAIA '78
Gary Y. Kaplan '79
Robert F. Grove '80

**Student Chapter
Presidents**

P. Cantwell, N.J. School of
Architecture at NJIT
Tony Dew,
Burlington Co. CC
Dorrie Koenig,
Mercer Co. CC
Princeton University

AIA Regional Director

Harold D. Glucksman

Executive Director

Helen T. Schneider,
Hon. AIA

Executive Secretary

Ilse B. Hovorka

***Alternates**

ARCHITECTURE new jersey is the official publication of New Jersey Society of Architects, a Region of The American Institute of Architects, and is the only architectural publication in the state. The purpose of the quarterly publication is to advance an increased public awareness of our visual environment. It carries news, articles and representations of buildings of current interest.

3,600 copies are distributed to every member of the N.J. Society of Architects, consulting engineers, people in related fields and others whose fields of interest include Architecture, such as leaders in business, commerce, industry, banking, education, religion and government at all levels.

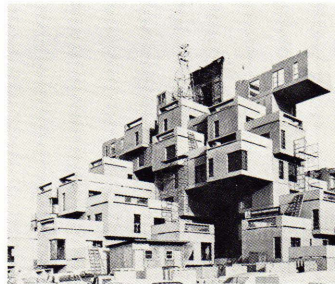
Views and opinions expressed in ARCHITECTURE new jersey are those of the writers and not necessarily those of the New Jersey Society of Architects.

Subscription: \$6 per year
Controlled Circulation
East Orange, N.J. 07018
Printed by White Eagle Printing.

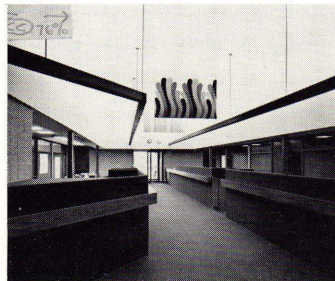
new jersey Architecture

Vol. 12 No. 2

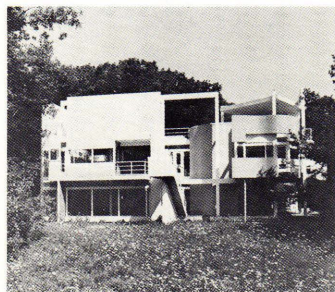
April/May/June 1978



P. 6



P. 9



P. 19

5 Editorial: The Regulatory Dilemma

6 Honors

7 Outlook

8 Historic Preservation

— Preservation and adaptive use of historic structures.

9 Facility Programming

— The activity in which the objectives of the client meet with the professional knowledge of the architect.

10 Interior Design

— A natural extension of the architect's design effort.

12 Facade Improvement

— Development of guidelines for improvement of a decaying downtown district.

14 Foreign Markets

— When local business markets declined, architects looked outside the U.S.A. for work.

16 Corporate Identity Programs

— Development of such programs utilize the skills already existing in the architect's office.

18 Office Profile

— Michael Graves, Architect.

Editorial Board

Chairman

Edward N. Rothe
D. Levon Gedickian
Michael Greenberg
Michael C. McAneny
Alan Spector

**Graphics
Editor**

Richard M. Nadler
Helen T. Schneider

Editor's Note

From the front cover to the back page of this issue you will notice that the format and graphics of ARCHITECTURE New Jersey is new. The change is the result of the Editorial Board's desire to give a strong, new image to this important architectural publication. Its execution is the work of the Editorial Board's new graphics director, Mr. Richard Nadler.

At this time, the board wishes to extend special thanks to Mr. D. Levon Gedickian, who contributed so much of his creative time as graphics director of ARCHITECTURE New Jersey for the past several years.

Cover:

Nabisco World Headquarters
Skylighted Atrium
The Grad Partnership, Architect

The Regulatory Dilemma

By Richard Bottelli, AIA

In September, 1977, the State of New Jersey published a document entitled "Directory of State Programs for Regulating Construction." This publication contained a compilation of all current permits, certifications and approvals required by state regulatory programs for new construction or substantial expansion. The introduction states "It is intended to provide assistance for the day-to-day general construction activity which occupies most of the time of the regulatory agencies and purposely avoids highly specialized and infrequently proposed projects such as power generating stations, airports and the like." Even with these ground rules, the Directory still goes on to detail the provisions of some 50 state regulatory programs, all requiring separate applications, reviews and approvals.

These permits, certifications and approvals, are issued by various Office, Bureau and Divisional sub-units of State Government Departments and by several special jurisdictional agencies. The permits listed include such familiar items as "Construction Permit," "Access Driveway Permit" and "Certificate of Occupancy" and some more esoteric items like "Permit to Construct, Install or Alter Control Apparatus or Equipment for the Storage and Transfer of Volatile Organic Substances." The Directory also has very useful checklists of required exhibits to be submitted with each separate permit application which may, one finds, include evidence of having already secured other permits or approvals under different governmental regulatory programs.

The Directory lists only State regulatory programs. Before undertaking any construction activity, a person must also secure municipal planning and zoning approvals and building construction permits together with miscellaneous county, district, regional and Federal certifications, and approvals which may also be required. In addition to development regulations at all levels of government, special certifications and approvals related to either a building's particular occupancy or its funding source may also be required.

The need for sensible regulation of the built environment is essential, but a streamlining and coordination of the current multiple layers of governmental regulation is equally essential. The compilation and publication of the state's permit directory is the

first step in this direction and puts in print the magnitude of the potential problems.

While the growth of regulatory statutes at all governmental levels may be a fact of life, the real problems for design professionals and the construction industry are usually created by the administration of the statutes. A good law with broad support for its public purpose can become a nightmare in the hands of regulation writers, review agencies, and zealous special interest segments of the general public. It is not the intent of development regulation to prohibit development but to insure that such development is consistent with pre-established policy and standards. In order for such regulation to be effective, the policy objectives and development standards should be clearly documented and must reflect a consensus of the majority of citizens for whom the regulatory protection is intended. Ambiguity in the drafting of legislation, in the writing of regulations or in their review level implementation, can distort the original legislative intent beyond recognition.

From my experience, the problems are usually found in the development review process rather than its underlying legislative authority. One frequently finds an inability or unwillingness to distinguish between determining development policy and standards and the technical review function which ensure that construction will be in compliance with such established requirements. For example, the Municipal Construction Official functions not as a building code author but as a review officer who may accept nothing less than the code requires and may demand nothing more. This clarity of purpose is frequently lost at other levels of governmental review and in the extreme, individuals or boards can be found functioning simultaneously as authors and enforcers of development policy and standards.

The inappropriate use of public forums are equally troubling to design professionals. Citizen groups and public boards and commissions frequently remain silent when planning regulations and development standards which will be public policy are being developed only to come forward later to oppose individual projects which are in fact which implement established public policy may be a manifestation of unhappy-complete conformity with such policy. Citizen concern and opposition to actual pro-

cess with the basic policy, but it is raised at the wrong time and directed at the wrong party. On construction projects having an intermunicipal or state-wide concern, design review procedures which were carefully developed to insure environmentally acceptable construction for the benefit of a majority of citizens are frequently used by a small minority as the basis to deny any development. Environmental impact statement hearings, intended to inform all interested parties of the details of design proposals, their impact on natural and social systems, and the reasons for such design decisions frequently become an emotional circus. As a consequence, planning and design time may be vastly extended resulting in escalating construction costs, and a continuation of the inadequate facilities or hazardous conditions which the projects seek to alleviate.

Finally, the rapid growth of regulatory control has produced a paradox which is most difficult to address. The increased use of the legislative process to solve all manner of perceived problems has brought government intervention into areas where clear rational standards are not available or even possible. Such legislation takes away the basic right of individuals to act freely when such action is not in violation of any statute or common law and gives the right to others to broadly constrain such freedom with very limited answerability.

When legislative process produces this regulatory anarchy, only extraordinary levels of wisdom or corruption can produce effective action. Since we can expect both of these elements to be found only in small quantities, it seems inevitable that the effects of any expansion of regulatory control in New Jersey will be to decrease incentive for capital investment, to increase time delays and frustration and to continue our state's current economic stagnation. Achieving a balanced level of public intervention which will allow the private marketplace to flourish while still protecting our irreplaceable natural resources must be New Jersey's first priority in the coming decade.

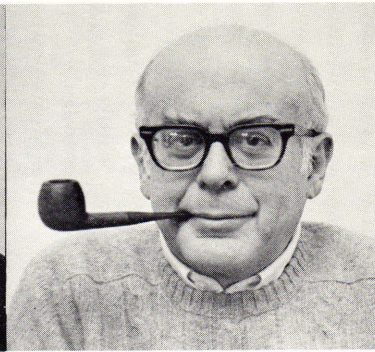
Editor's Note:

Mr. Bottelli is Past President of the New Jersey Society of Architects and currently serves as Summit's Planning Board Chairman and a member of its Zoning Board of Adjustment.

honors



Dr. Suzanna Keller



Dr. Robert Gutman



Nicholas Solovioff

AIA HONORS

Four New Jersey professionals were the recipients of AIA Honors for their outstanding contributions to the profession of architecture. Two received the AIA Medal bestowed annually to honor those individuals or organizations that have inspired or influenced the architectural profession, and two received Honorary Membership for their distinguished contributions to architecture or to its allied arts and sciences.

Dr. August Komendant, a structural engineer from Upper Montclair and Nicholas Solovioff, an artist from Cape May, were recipients of the AIA medal. Dr. Robert Gutman and Dr. Suzanne Keller, both sociologists and professors at Princeton University, were elected Honorary Members of the AIA. All received their awards at the AIA Convention in Dallas in May.

Dr. Komendant is an innovative structural engineer, author, and teacher whose work in advanced concrete structures has received worldwide recognition.

In 1975 and 1976, Komendant was the Visiting Distinguished Professor at Pratt Institute in New York, teaching "The Philosophy of Technology."

Solovioff has devoted a major portion of his career to recording architectural subjects. In a successful effort to satisfy man's appetite for viewing great constructions in progress, Solovioff documented with his illustrations the development of the World Trade Center between 1967 and 1973 when he was artist in residence for the Port of New York Authority.

Solovioff has not limited his interest to the past and was the illustrator for a proposed revamping of public space in Washington, D.C., for "A Report of the President's Council on Pennsylvania Avenue" in 1964.

A first generation American Solovioff was much influenced by his father, an officer in the Imperial Russian Navy who immigrated to the U.S. and became an aeronautical engineer. Solovioff received his B.A. in 1948 and his M.F.A. in 1951 from Harvard University, where he taught from 1949-1951. He also taught at the Parsons School of Design in New York during 1958.

Solovioff became a free-lance illustrator a number of years ago. Since then, his work has been seen in such magazines as Smithsonian, Horizon, and Fortune. He has also illustrated two Time-Life books: "Ancient Egypt" and "Ancient Rome."

Dr. Robert Gutman, is a pioneer in the study of the relationship between environment and behavior. His sociological research, which has resulted in such books as, "The Marks of Oppression: A Psycho-Social Study of the American Negro" (1951 with Abram Kardiner and Lionel Ovesey) and "Neighborhood, City and Metropolis: An Integrated Reader in Urban Sociology" (1970 with David Popenoe) has brought him to the study of architecture and its influence on urban society.

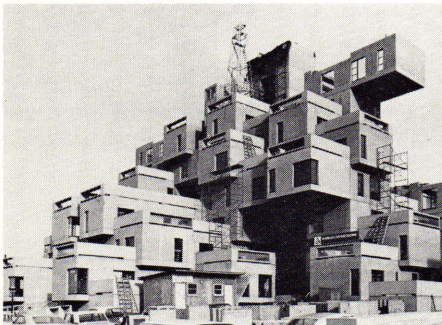
Gutman's recent work has been dominated by this subject. "Site Planning and Social Behavior," "What Schools of Architecture Expect from Sociologists," "Builder Evaluation, User Satisfaction and Design," and "The Social Function of the Built Environment" are only a few of the articles which have helped place Gutman at the forefront of his field.

Gutman also contributes to the profession in his work as a professor of architecture, helping his students to gain insight into the sociology of housing. An active consultant, Gutman is a participant in the study of architectural education sponsored by the Mellon Foundation; the Advisory Committee on Landscape Architecture for the Harvard Graduate School of Design; the American Society of Civil Engineers' Environmental Impact Analysis Council; the Committee on Education's National Council of Architectural Registration Boards, and the AIA's Research Advisory Panel.

Dr. Suzanne Keller has played an important role in the understanding of architecture as a social art. According to nominating architects, "She has brought the frontier of the social science to the aid of the profession in the community."

Keller is the author of three books, "Beyond the Ruling Class" (1963), "The Urban Neighborhood" (1968), and "Sociology" (1975, a text with Donald Light). She has also written numerous articles and distinguished reports on the behavioral impacts of new buildings and communities.

As a professor at Princeton University's School of Architecture and Urban Planning for the past ten years, Keller's contributions have extended beyond those of a scholar. She has served as a consultant on poverty, urban planning, new towns, and management training; and has participated in several AIA Regional/Urban Design Assistance Teams (R/UAT).



Above: Habitat '67



Above: Kimbell Art Museum

Below: Solovioff Fortune Cover



outlook

by Alan Spector, AIA

First Quarter '78

The construction recovery in New Jersey that began early in 1977 was partially interrupted by the winter's severe weather, but appears to be heading back on track at the close of the first quarter of 1978.

After registering a large decline in February, nonresidential construction in New Jersey increased its volume, and closed the first quarter 50 percent ahead of last year's rate. Residential construction was plagued by the cold weather, and began its recovery in March, registering only a three percent increase over the first quarter of 1977.

The brightest areas of nonresidential construction activity were stores and shopping centers (more than three times ahead of the 1977 pace), and office buildings (more than twice last year's rate). Government building was moving ahead at nearly twice the 1977 pace, thanks largely to the numerous public works projects entering the construction pipeline in the first quarter of 1978. Educational buildings were ahead of last year's pace, while medical buildings and manufacturing plants fell behind.

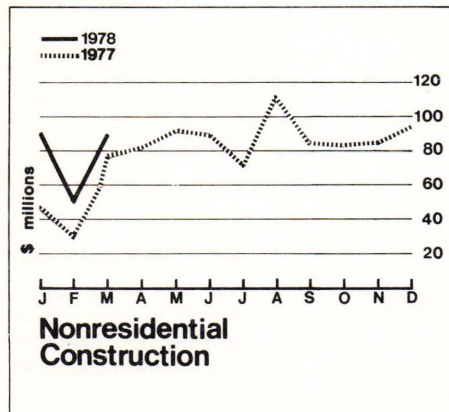
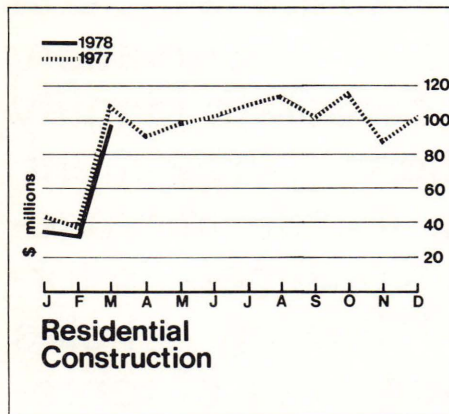
Forecast

New Jersey's economic prospects remain favorable, provided that the national econo-

mic situation continues to expand. While most forecasters expect the national economy to expand throughout the balance of 1978, they do not anticipate the amount of growth experienced during the past three years. According to the New Jersey Department of Labor and Industry, some analysts fear that the inflation rate could accelerate, and this could cause the expansion to be thrown off course.

Despite the interruption of construction activity caused by last winter's severe weather, a complete rebound is expected during the second quarter of 1978, on the strength of new housing, nonresidential building, and the flood of public works projects in the state.

Based on figures compiled by Engineering News Record, nonresidential construction projects now on the drawing boards are considerably ahead of last year's rate in New Jersey. Leading this activity are stores and shopping centers (up six times over 1977's pace), office buildings (up nearly four times), medical buildings and government buildings (both about three times ahead of last year's rate). Educational buildings and manufacturing plants lag behind the 1977 pace.



Statewide Construction Activity

	Jan. '78	Feb. '78	March '78	Year-to-date 1978	Totals (5) 1977	%Change 1977-78
Nonresidential (1)	\$89,700,000	\$47,894,000	\$86,383,000	\$226,388,000	\$151,250,000	Plus 50%
Residential (2)	35,457,000	34,692,000	98,815,000	186,923,000	181,919,000	Plus 3%
TOTAL BUILDING	125,157,000	82,586,000	185,198,000	413,311,000	333,169,000	Plus 24%

Statewide Nonresidential Construction

First Quarter 1978

	Bidding Volume (6)	% Changes 1977-78	New Plans (7)	% Change 1977-78
Stores & Shopping Centers	\$32,300,000	Plus 349%	\$121,750,000	Plus 616%
Office Buildings	12,495,000	Plus 212%	97,150,000	Plus 398%
Medical Buildings	6,228,000	Minus 85%	55,829,000	Plus 330%
Educational Buildings	10,629,000	Plus 61%	33,862,000	Minus 71%
Government Buildings	7,311,000	Plus 171%	16,257,000	Plus 298%
Manufacturing Plants	300,000	Minus 65%	5,425,000	Minus 75%

FOOTNOTES

- (1) Nonresidential buildings include commercial, manufacturing, educational, religious, administrative, recreational, and other buildings not designed for shelter.
- (2) Residential buildings include houses, apartments, motels, dormitories, and other buildings designed for shelter.
- (3) Statistics for selected counties shown are based on figures derived from standard metropolitan areas within the counties.
- (4) All statistics are based on monthly reports of contracts for future construction, prepared by F.W. Dodge Division of McGraw-Hill Information Systems Co.
- (5) Cumulative figures for "Year-to-Date Totals" reflect adjustments not distributed to the individual months.
- (6) Based on figures for projects actually bid and under construction in 1978, as compiled by Engineering News Record.
- (7) Based on figures for projects on the drawing board in 1978 but not yet out to bid, as compiled by Engineering News Record.

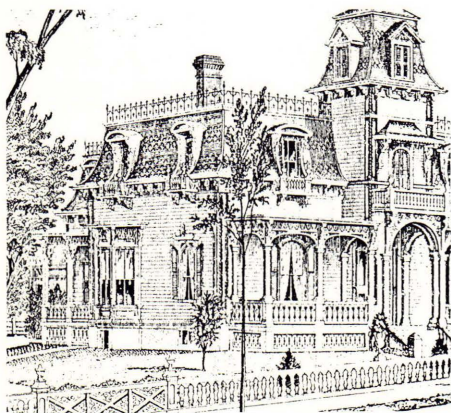
Construction Activity by Counties (3)

	First Quarter '78	% Change 1977-78		First Quarter '78	% Change 1977-78
ATLANTIC COUNTY			MIDDLESEX COUNTY		
Nonresidential	\$11,792,000	Plus 367%	Nonresidential	46,307,000	Plus 136%
Residential	4,239,000	Plus 55%	Residential	8,556,000	Minus 57%
TOTAL BUILDING	16,031,000	Plus 202%	TOTAL BUILDING	54,863,000	Plus 39%
CUMBERLAND COUNTY			MONMOUTH COUNTY		
Nonresidential	1,829,000	Plus 526%	Nonresidential	8,123,000	Minus 61%
Residential	1,508,000	Minus 41%	Residential	19,365,000	Plus 16%
TOTAL BUILDING	3,337,000	Plus 17%	TOTAL BUILDING	27,488,000	Minus 27%
HUDSON COUNTY			PASSAIC COUNTY		
Nonresidential	6,465,000	Plus 326%	Nonresidential	8,276,000	Plus 21%
Residential	3,159,000	Minus 85%	Residential	8,608,000	Plus 186%
TOTAL BUILDING	9,624,000	Minus 56%	TOTAL BUILDING	16,884,000	Plus 72%
MERCER COUNTY					
Nonresidential	6,319,000	Minus 31%			
Residential	8,012,000	Plus 130%			
TOTAL BUILDING	14,331,000	Plus 13%			

New Jersey architects, in efforts to diversify their practices are becoming actively involved in areas of architecture until recently considered peripheral. Communications with such firms have indicated that these areas include interior design, historic preservation, energy consultation, corporate identity programs, construction management, facility programming, facade improvement programs and involvement in foreign markets. The following articles briefly describe the activities of representative firms in a number of these areas.

Michael C. McAneny, AIA

Historic Preservation



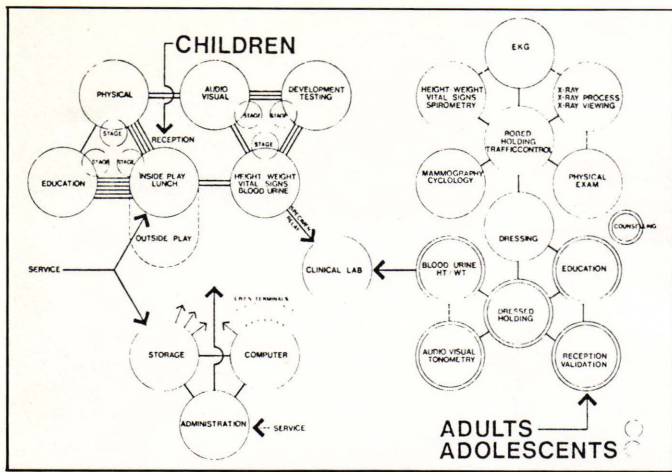
Architect Charles Detwiller of Plainfield has been involved with the preservation of historic structures, particularly as the buildings might be affected by new construction. This involves reviewing, inspecting and researching projected new highway routes to see if any significant structures having historic importance, and such newer structures which might possess exceptional architectural merit, might be destroyed or adversely affected by new construction. It involves not only those buildings already on the National Register for Historic Places, but also those that might qualify and to date have been either overlooked or not yet nominated.

National Register Listings

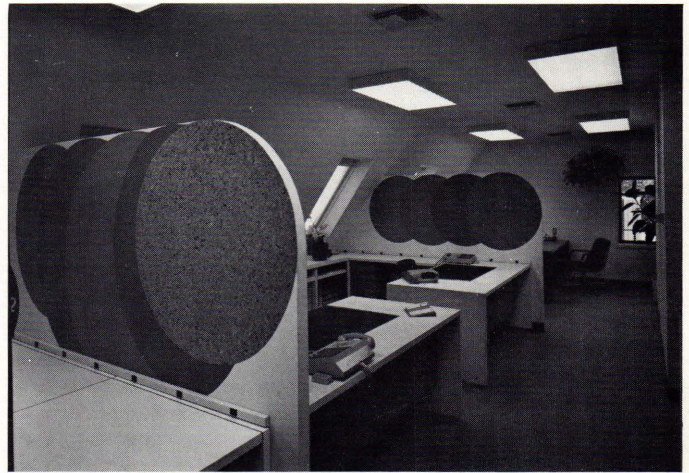
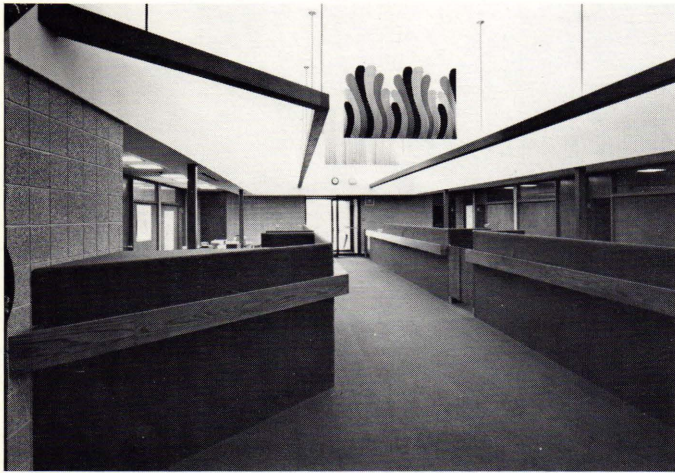
According to Mr. Detwiller, another new activity, mainly applying to architects with an historic preservation background, is the preparation of paper work involved in nominations for listing on the National Register. This applies to both individual buildings and large districts comprising as many as 100

structures, which each have to be individually analyzed, inventoried and commented upon to describe what changes might best help the image of the Historic District. It also required a redrafting of existing Zoning Laws of the community to best serve the special requirements for that particular Historic District.

Finally, Mr. Detwiller states that the one other field that brings the worlds of historic preservation and the new techniques and attitudes required by the energy crisis together is the adaptive use of old buildings. This has proved economically practical and necessary as a method to make use of one of our important national resources: the existing man made environment filled with reusable empty structures. With an innovative approach, many historic and significant structures can be saved, preserving their exteriors as originally conceived and reorganizing the interior to suit present day needs. This is both a challenge and opportunity for today's architects to show their ingenuity and sense toward practical savings.



Top: Bubble Diagram



Above, right top and bottom; Commodities Corp., The Hillier Group

Facility Programming

In connection with the provision of interior design services, The Eggers Group, The Grad Partnership and The Hillier Group all offer a pre-design planning service most frequently termed "Facility Programming." Facility Programming is the process by which information about the requirements of the prospective or existing occupant are collected, analyzed and organized to guide the client and the architect or interior designer in the development of planning and design solutions.

In-Depth Interviews

Typically, the process begins with a series of in-depth interviews with key personnel, as designated by the client. The scope of the interviews varies, of course, with each architectural firm and with the type of client, but most are designed to collect information concerning how the client functions. For example, those questions asked of a client considering the construction of office space might include: statement of the department's function and a copy of its current and/or proposed organizational chart; present number of personnel and their location in existing facilities, listed by functional groups; the organization's personnel projec-

tions for specific calendar year-end periods; its functional adjacencies and relations with other units; an estimate of typical and peak daily outside visitor traffic to the department; an estimate of the frequency, duration, and size of meetings originated by the organization and whether held in private offices or conference rooms; training requirements for new and present employees; food service requirements of its staff and visitors; and a classification of major categories of records expressed by file drawers, including status of access and retention schedules.

Collective Analysis

The above information is analyzed collectively and used as the basis for facility programming recommendations. Basic recommendations most often requested by the client include: square footage requirements at move-in and one or two future dates, suggested work station standards, interdepartmental and intradepartmental adjacency requirements and schematic occupancy solutions, which unite all of the client's needs within one or several optimum "stacking" or massing configurations.



Above: Nabisco Executive Office
The Grad Partnership

Interior Design

In an attempt to offer full architectural services in response to client's needs and desires for a single source of responsibility and accountability, many New Jersey architectural firms are now beginning to offer interior design services either from an existing office structure or through a separate subsidiary organization. All find that time and cost savings can be realized for the client and, at the same time, a functionally and aesthetically coordinated design effort can be achieved.

Balanced Design Relationship

As a quite natural extension of design effort, these firms are able to insure that the interior spaces of their buildings work and look as they were intended and possess a planned and balanced relationship to exterior design statements. Those areas of input which these firms are becoming involved with include: floor and wallcovering

selection, ceiling and lighting design, art selection, graphic design, directional signage design, interior planting specification, selection of solar control devices, selection and/or design of furniture and equipment (either individual pieces or full systems) and design and detailing of both simple and very sophisticated cabinetry.

Some interiors recently completed by New Jersey firms are: the new corporate headquarters for National CSS in Wilton, Connecticut (The Hillier Group); the Nabisco Global Headquarters Building in Hanover, New Jersey (The Grad Partnership); administrative production and research space for Creations Aromatiques in Parsippany, New Jersey (the Gilchrist Partnership); the interior of a 196 bed nursing home (A 11 Interiors) and executive office space for A&P Corporation in Montvale, New Jersey, Ampacet Corporation in Mount Vernon, New York and Shell Oil Corporation in West Orange, New Jersey (Rose, Dubin & Ventura).

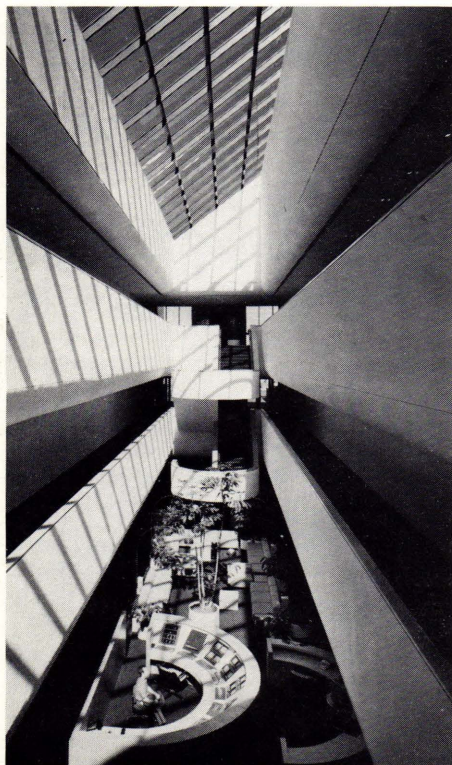


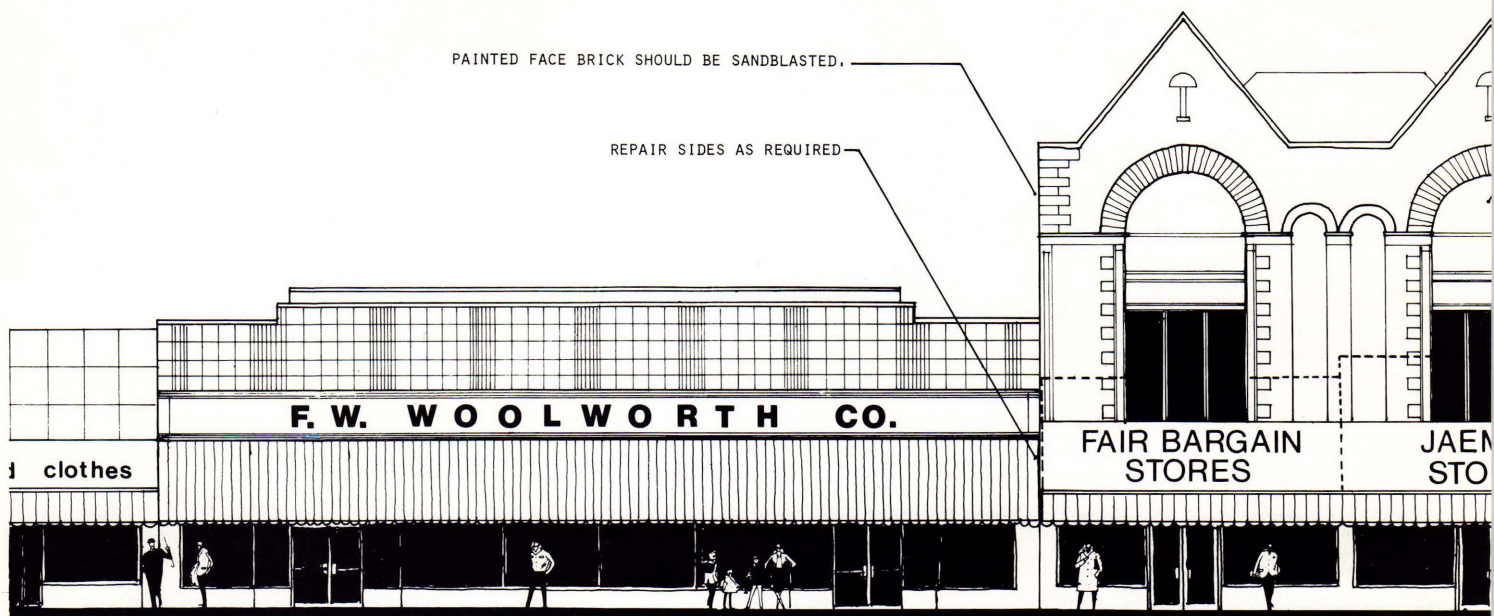
Left Above: Creations Aromatique Main Entrance, The Gilchrist Partnership

Left: Below: Nabisco Atrium, The Grad Partnership

Above: Creations Aromatique Conference Room, The Gilchrist Partnership

Below: Monsanto Lobby, Rouse, Dubin and Ventura





Facade Improvement

Ecoplan, a Hackensack architecture and planning firm, was retained by the City of Hackensack to develop guidelines for a program of low cost improvements to the facades of buildings located within a decaying section of the city's downtown business and commercial section. Specifically, the problem the firm (headed by Martin Santini, AIA) was faced with was a section of Main Street, between Morris Street and the tracks of the New York, Susquehanna and Western Railroad, which was plagued with sixteen vacant stores, suffering from years of haphazard, un-coordinated and non-architectural "modernization" and littered with the debris of every type and size of sign imaginable.

Guidebook Prepared

After a detailed examination and analysis of the existing conditions, Ecoplan prepared a "Main Street Facade Improvement Guidebook", submitted to the City Manager in June of 1977. It developed basic facade improvement criteria, applied them to each building within the area outlined above, established general allowances for improvement costs and illustrated typical details. All of the improvements suggested were estimated to cost between \$500 and \$2,000 for building. The program suggested included the following courses of action:

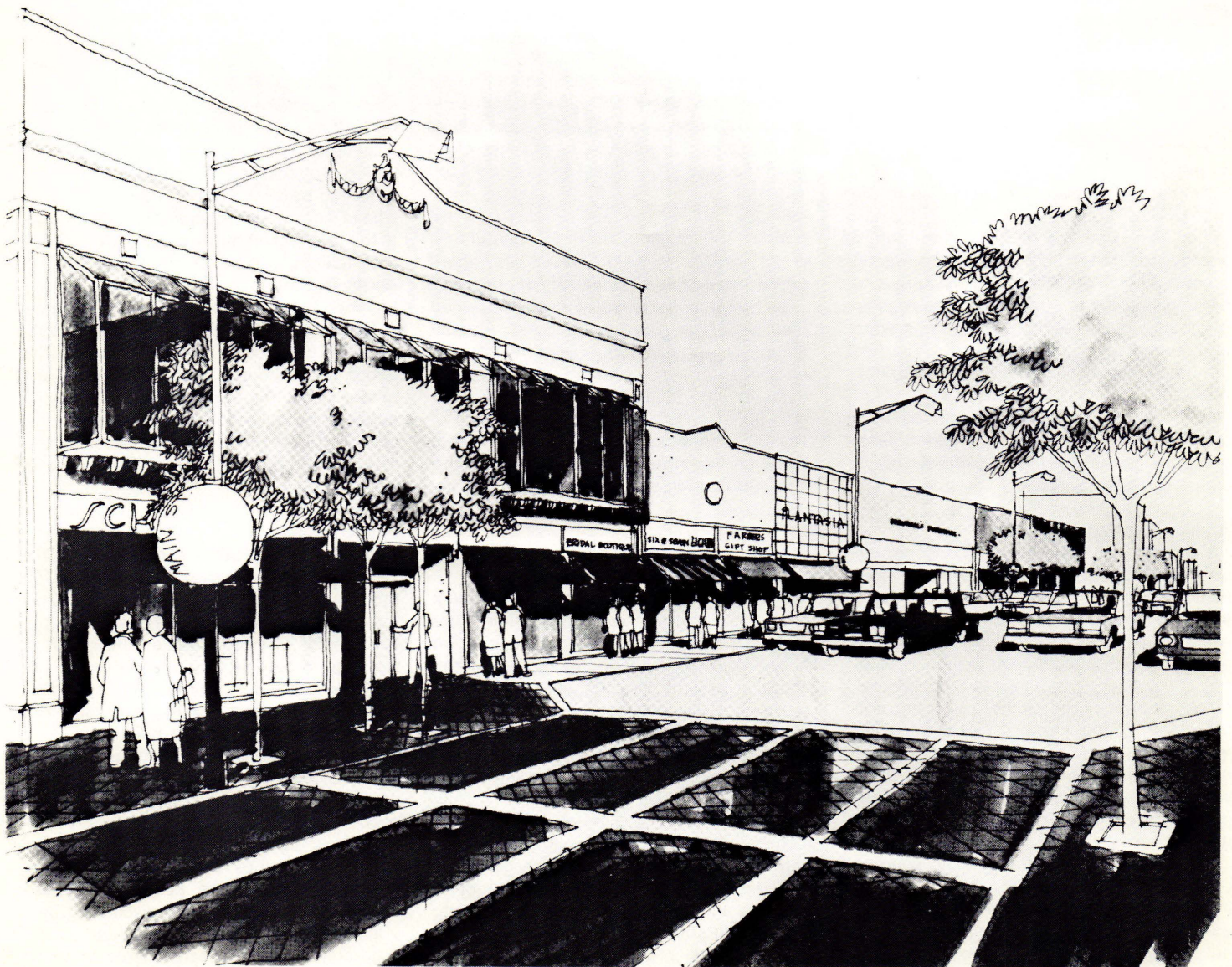
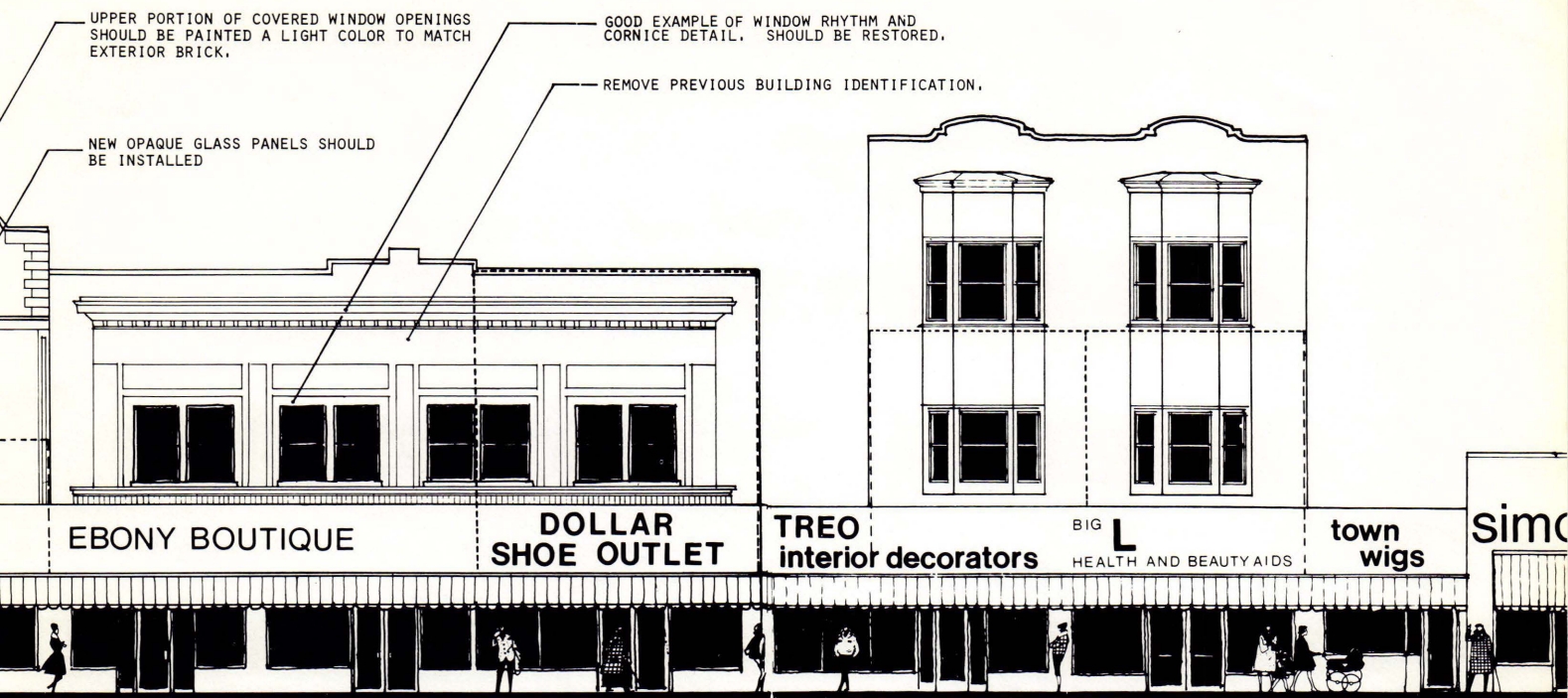
- Removing nearly 20 projecting signs and replacing them with flat signs that are noticeable yet blind with the building or group of buildings.
- Restoring the architectural details that have been obliterated, such as windows, stone sills, lintels (tops of window or door frames), cornices, brackets, and other authentic parts of original facades.
- Renovating buildings by painting them or adding new design elements repre-

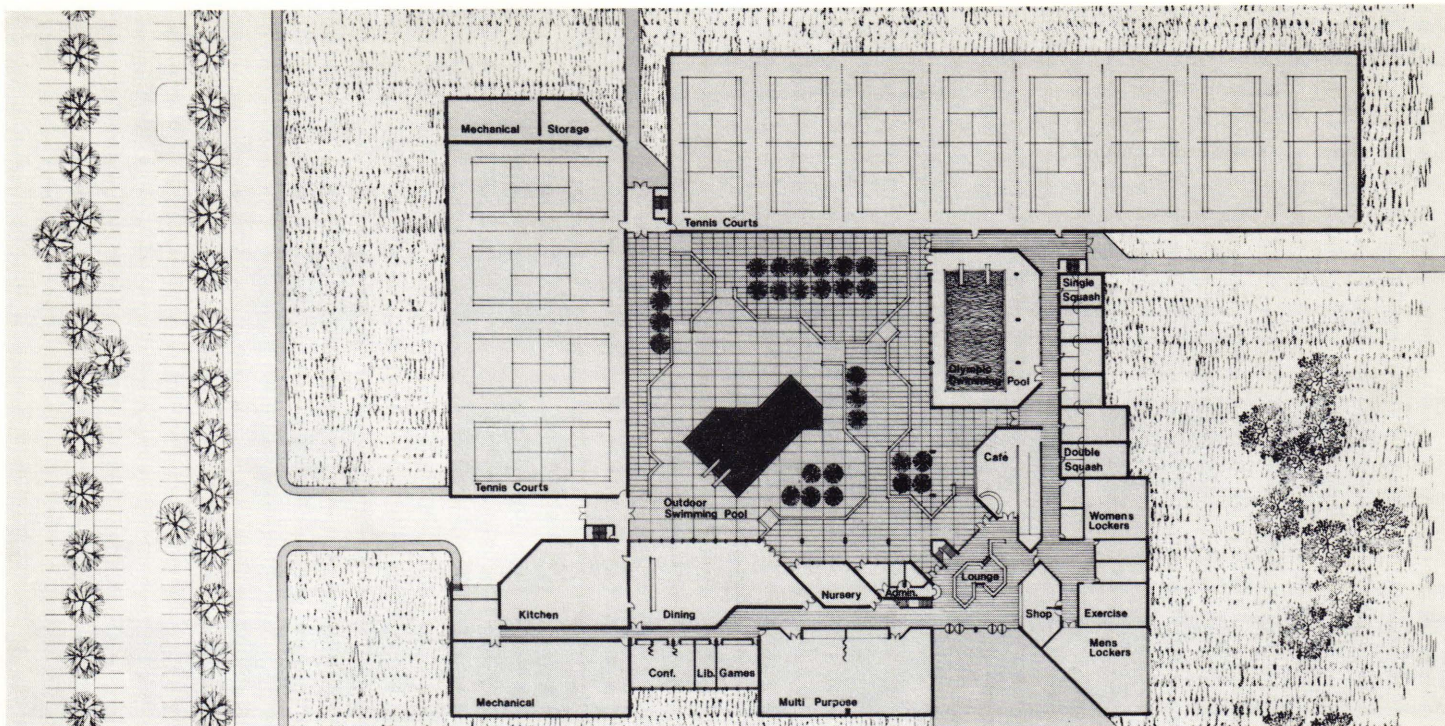
sentative of their character, such as awnings and graphic panels.

- Converting vacant buildings into new uses, while respecting their architectural style and appearance. (Main Street has several buildings which could be converted into office space and residential units on the second and third floors.)

The facade improvement is a part of the City's long range plan for the area, which also includes improvements of automobile circulation, expansion of parking facilities, new and expanded parks, the creation of a historic "enclave" of noteworthy memorable buildings and the construction of a 250,000 square foot public/private office complex.







Above, right: Jeddah Sports Club

Foreign Markets

As sales and revenues decreased in the mid-1970's, Princeton architects CUH2A began to look outside the USA for future work, particularly to those oil-producing nations of the Middle East which were embarking on substantial capital expansion programs. Many larger design firms were already active in the area, and a few had been well-established for some time. CUH2A realized that such a development effort would require substantial resources at a time when such resources seemed least available, but in the fall of 1975 the decision was made to proceed.

Arabian Peninsula Selected

CUH2A's initial efforts were concentrated on the Arabian peninsula in Kuwait, UAE (United Arab Emirates), and Saudi Arabia itself, for several reasons: these nations were already involved in construction programs requiring substantial design consultation which was not available domestically; funds for these programs were allocated and the governments involved had established a reputation for financial reliability and Dr. Ahmed Azmy, a partner in the firm upon whom they were relying to lead their development effort, had good initial contacts in these areas.

The most visible and accessible sources of potential work were those government ministries with established construction agencies. CUH2A focused upon those in fields where they had prior expertise and which were contracting for construction in

the traditional way, by competitive bidding based upon completed contract documents.

They found that contracting for a majority of the available work, particularly for larger projects, was handled on a design-build basis. The necessary contractor associations would require much additional time, effort and resources to develop. The private sector, although active, was comparatively inaccessible and was found to require a corresponding development effort. Accordingly, it was decided to establish a track record before attempting to expand into these areas.

CUH2A's initial success occurred when they were selected by the Saudi Arabian Ministry of Youth Welfare as architects and engineers for a cycle-racing and multi-sport complex, one element in a vast sports city now under construction on the outskirts of Riyadh. Contracts were signed in June of 1976 and completed documents for the \$100,000,000 project were submitted one year later.

Problems Encountered

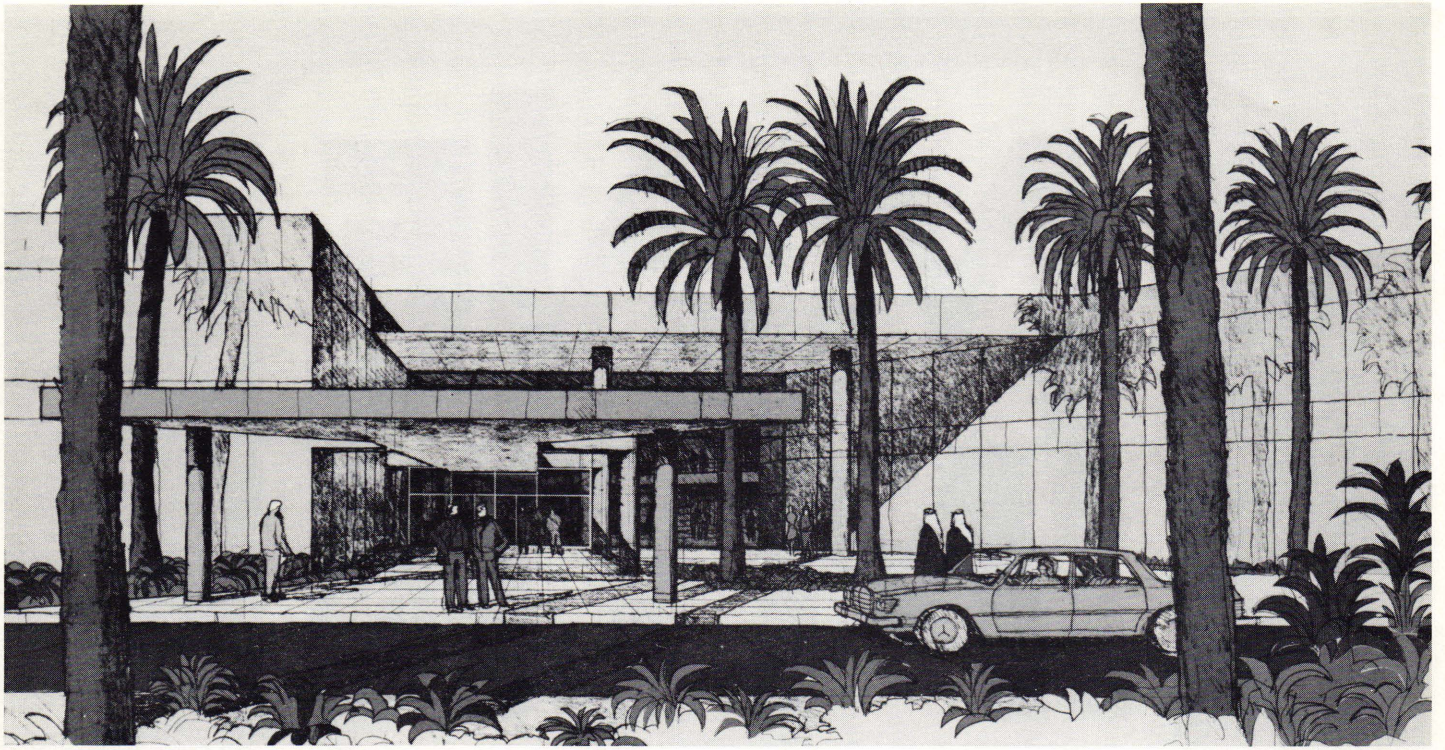
A number of interesting and complex problems required resolution along the way: CUH2A's entire office was converted to use of, and thinking in, the metric system almost overnight; they acquired a bi-lingual staff of professionals and support personnel (although contract documents are in English, all other documents, reports and correspondence are in Arabic as well); foreign materials, equipment, and design consultation, mostly European, required integration with their own, with the attendant problems of coordination; their contract required a complete and detailed quantity survey, in the European tradition; the opening of an office in Saudi Arabia necessitated entry into the local real estate rental and construction markets, never an easy matter and far more difficult

5,000 miles from home in a land of different conventions and a runaway sellers' market; and finally, the problems of working within the structures of the banking system and governmental regulations were every bit as difficult as they had been led to expect.

In order to qualify for larger and more varied overseas commissions, CUH2A has begun to develop joint ventures with firms whose capabilities complement their own. In the first such venture, to achieve success, they teamed with the firm of CH2M Hill of Portland, Oregon to win a planning contract for the Dammam area of Saudi Arabia. CUH2A's architectural and urban design capabilities will supplement the Portland firm's strong background in regional planning and public works engineering. They have been encouraged to join a number of international joint ventures, but to date have found that they can communicate most effectively with other US firms.

Future Plans

On the basis of these experiences, CUH2A is enthusiastic about their overseas efforts and optimistic about the future. They have expanded their activities into the private sector in Saudi Arabia, and are now working on a project in Riyadh which will combine office and retail space in the first such multi-use complex in the area. It will also be one of the tallest buildings in the city and the first of this scope to utilize steel frame construction. For a private client in Jeddah they are planning a sports club to serve as the focal point of a large development near the Red Sea north of the city. Working from their office in Riyadh, they have broadened their international base as well, and are presently discussing several housing projects in Egypt and a cultural center in Libya with clients in those countries.



Below: Khouzam International Trade Center



MINE MTN SPORTS

21 Mine Brook Road, Bernardsville, New Jersey

Corporate Identity Programs

The Sussna Design Office, Princeton architects and planners, has found that the planning and design of corporate identity programs has become a very successful and challenging aspect of its practice. Services offered include the development of logos, symbols, company names, color selections, type styles, package design, advertising, company stationery, labels, signage, vehicle identification, uniforms, and on occasion, the related interior design of office and/or plant spaces.

Benefits Realized

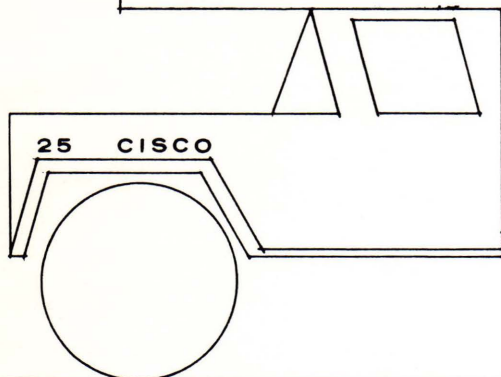
The firm identifies specific benefits inherent with this type of work: it requires direct communication with the top echelon of management; the programs often have limited lifespans (Sussna cites a period of approximately five years) which leads to a continuing working relationship with a client and the design processes involved in the development of such programs are, at the same time, fun and demanding for the architect because they deal with a very pure form of design concerning the creation of a unique visual scheme which symbolizes some abstract concept relating to the client's operations or products. They have also found that these programs utilize most of the skills

of programming, research, design and management which already exist in a typical architectural firm.

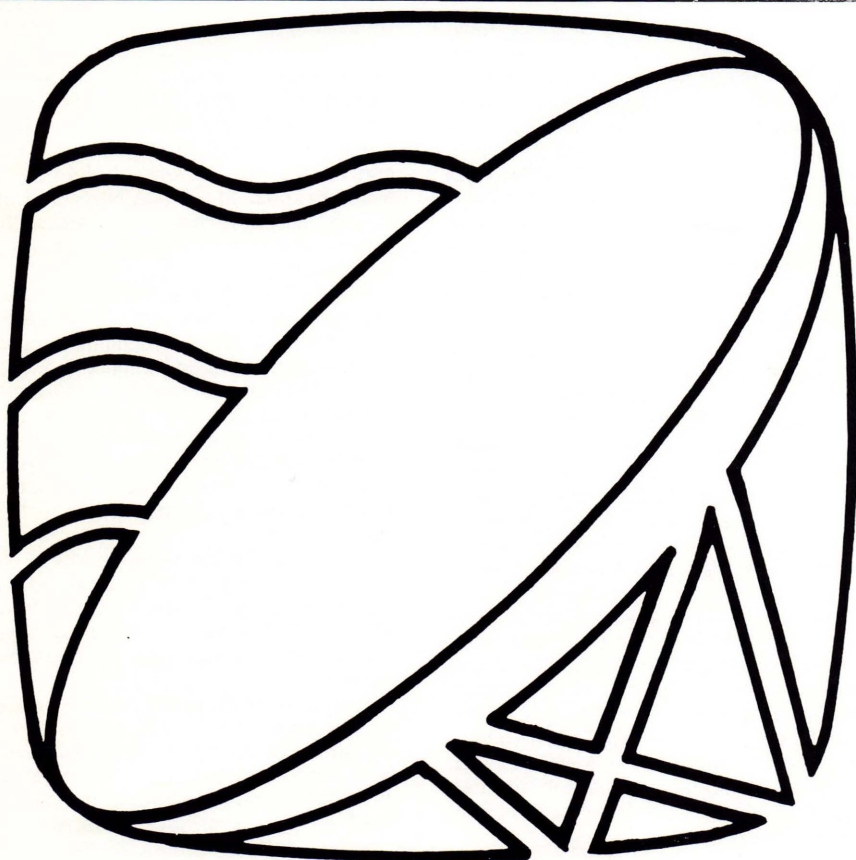
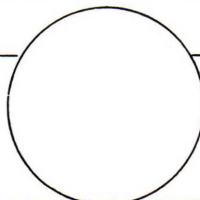
Engagements incorporating most of the services discussed above have been recently completed for Princeton Cablevision, Princeton, N.J.; Mine Mountain Sports, Princeton and Bernardsville, N.J.; Robertson's Ski and Sport, East Brunswick, N.J.; Varsity Sport Shop, Princeton, N.J.; and Level Line, Inc., Lakewood, N.J.



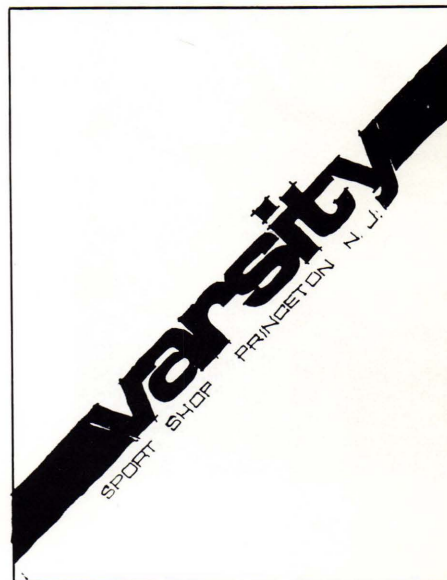
LEVEL LINE



BUILDING PRODUCTS LAKEWOOD NEW JERSEY



princeton
cablevision



Michael Graves Architect



The office of Michael Graves was established in Princeton in 1964. It has become known for its strong design orientation in its involvement with a variety of projects and services. The office's projects, which are not restricted to particular specializations, include residences, multiple family housing, medical facilities, museums, cultural facilities, and town plans. Some of these have been given national design recognition. The Hanselmann House in Fort Wayne, Indiana was given the AIA's National Honor Award in 1975, making Mr. Graves the first New Jersey architect to be so honored. Five projects have won PROGRESSIVE ARCHITECTURE design awards: the Rockefeller, Snyderman, Crooks, and Graves Houses, and the Chem-Fleur Factory Addition and Renovation in Newark. Mr. Graves has also been given eight citations of excellence from the New Jersey Society of Architects.

The office's work has been presented at the Museum of Modern Art in three exhibitions: "The New City", 1967; "The Architecture of Museums", 1968; and "Architectural Studies and Projects", 1975. Mr. Graves' architectural drawings have been exhibited at the Cooper-Hewitt Museum this past year in the show, "200 Years of American Architectural Drawing" which has been travelling and is now installed at the Art Institute of Chicago. His drawings were shown recently in "Drawing Toward a More Modern Architecture" at the Drawing Center in New York, about which he has written and lectured; this show is currently on display in Los Angeles. His work is also included in a current exhibition of drawings at the Rosa Esman Gallery in New York. In addition to his architectural work, Mr. Graves has painted more than twenty wall murals in various public and private buildings.

Graves was one of six architects selected to represent the United States at the XV Triennale in Milan, Italy, in 1973, and he is one of the twelve internationally known architects participating in an exhibition called "Roma Interrotta" now on display in Rome and soon to travel to Paris, London, and New York. The basis for this show is the Nolli map of Rome of 1748 which has been divided into twelve sections for which each architect has made an urban design pro-

posal assuming the eighteenth century city as a base.

Michael Graves received his training in architecture at the University of Cincinnati and at Harvard University. He was awarded the Prix de Rome in 1960 and studied at the American Academy in Rome for two years. Graves is Professor of Architecture at Princeton University, where he has taught since 1962. He has also served as Visiting Professor at the University of Texas, the University of Houston, U.C.L.A., and the New School for Social Research, and has lectured on his work throughout this country and Europe. He was one of eight architects asked to speak at the AIA National Convention in Dallas this May in a ceremony honoring architect Philip Johnson's receipt of the AIA Gold Medal.

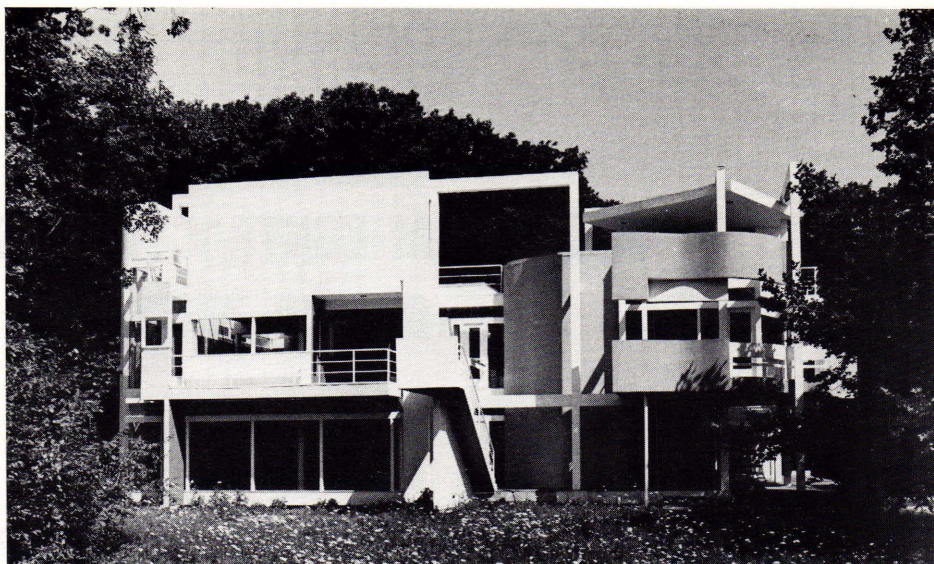
The Graves office staff numbers ten people, all of whom have received professional architecture training in graduate programs at various universities including Princeton, Yale, M.I.T., the University of Virginia, the University of Southern California, and the Architecture Association in London. Former members of the office have moved into positions of responsibility in teaching and practice; two have recently won the Prix de Rome.

Work in the office is given critical evaluation by the entire office on a periodic basis, but in general the office functions traditionally in that Mr. Graves is responsible for design and is assisted by job captains for individual projects.

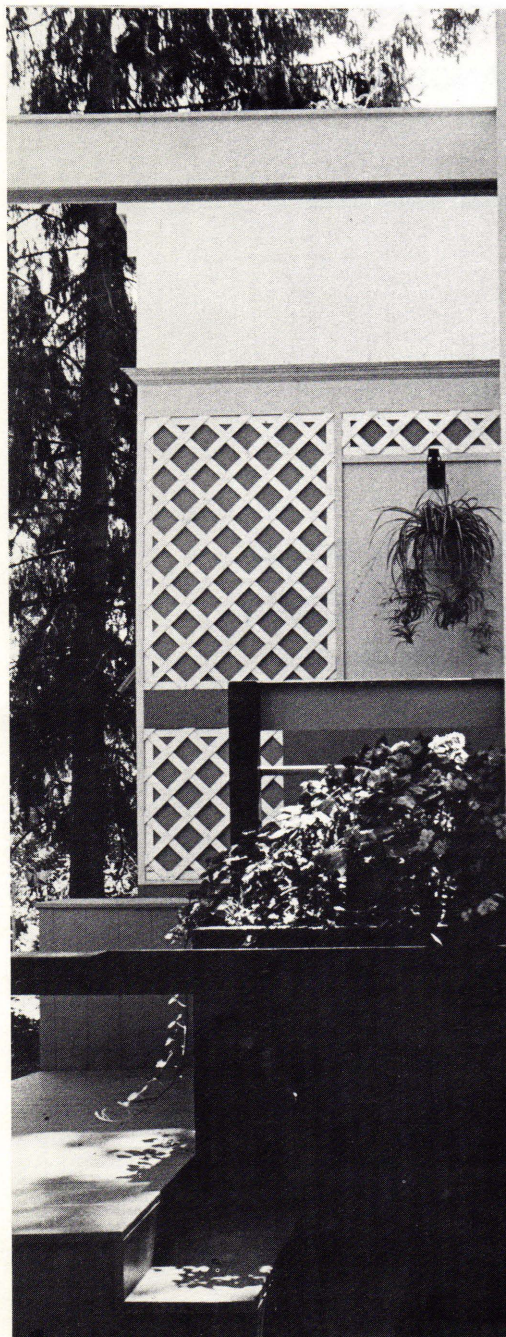
Current work includes several residences in New Jersey and Indiana, an office building and railroad station renovation in Millburn, New Jersey, and a wall mural for the John Witherspoon School in Princeton. The most extensive project underway at this time is a cultural center for the twin cities of Fargo, North Dakota, and Moorhead, Minnesota, a commission which was given to Mr. Graves after a national search. The project involves four buildings: a performance center with concert hall, a media center with public radio and television stations, a historical "interpretive" center, and an art museum. The complex, which spans the Red River of the North, places the art museum on the bridge itself as a pedestrian link between the two towns.



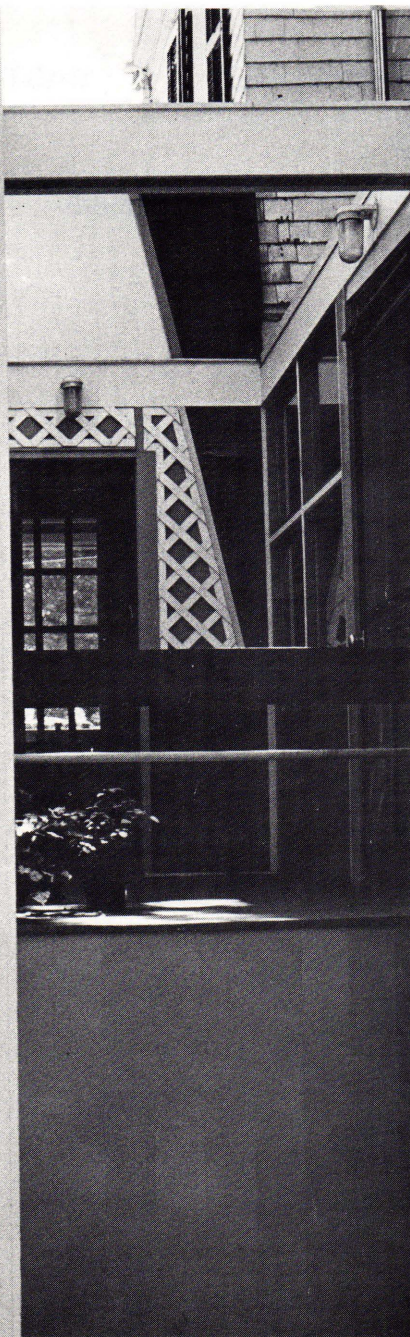
1



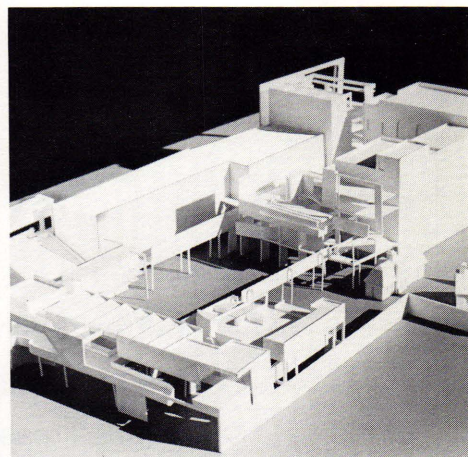
2



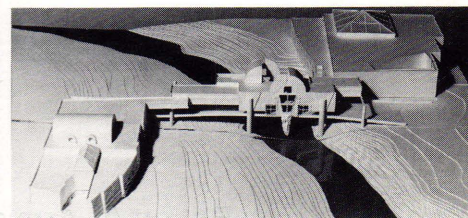
3



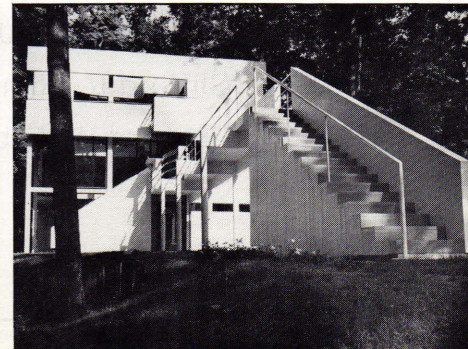
- 1. East Facade, Snyderman House, Fort Wayne, Ind.
- 2. South Facade, Snyderman House
- 3. Exterior Porch, Claghorn House, Princeton, N.J.
- 4. Newark Museum, Newark, N.J.
- 5. Cultural Center, Fargo, N.D. and Moorhead, Minn.
- 6. Entrance, Hanselmann House, Fort Wayne, Ind.



4



5



6

MECHANICAL CONTRACTORS ASSOCIATION OF NEW JERSEY, INC.

WILLIAM J. BULMAN, Executive Director

101 SO. HARRISON STREET EAST ORANGE, NJ 07018

201 - 675-6300

OFFICERS

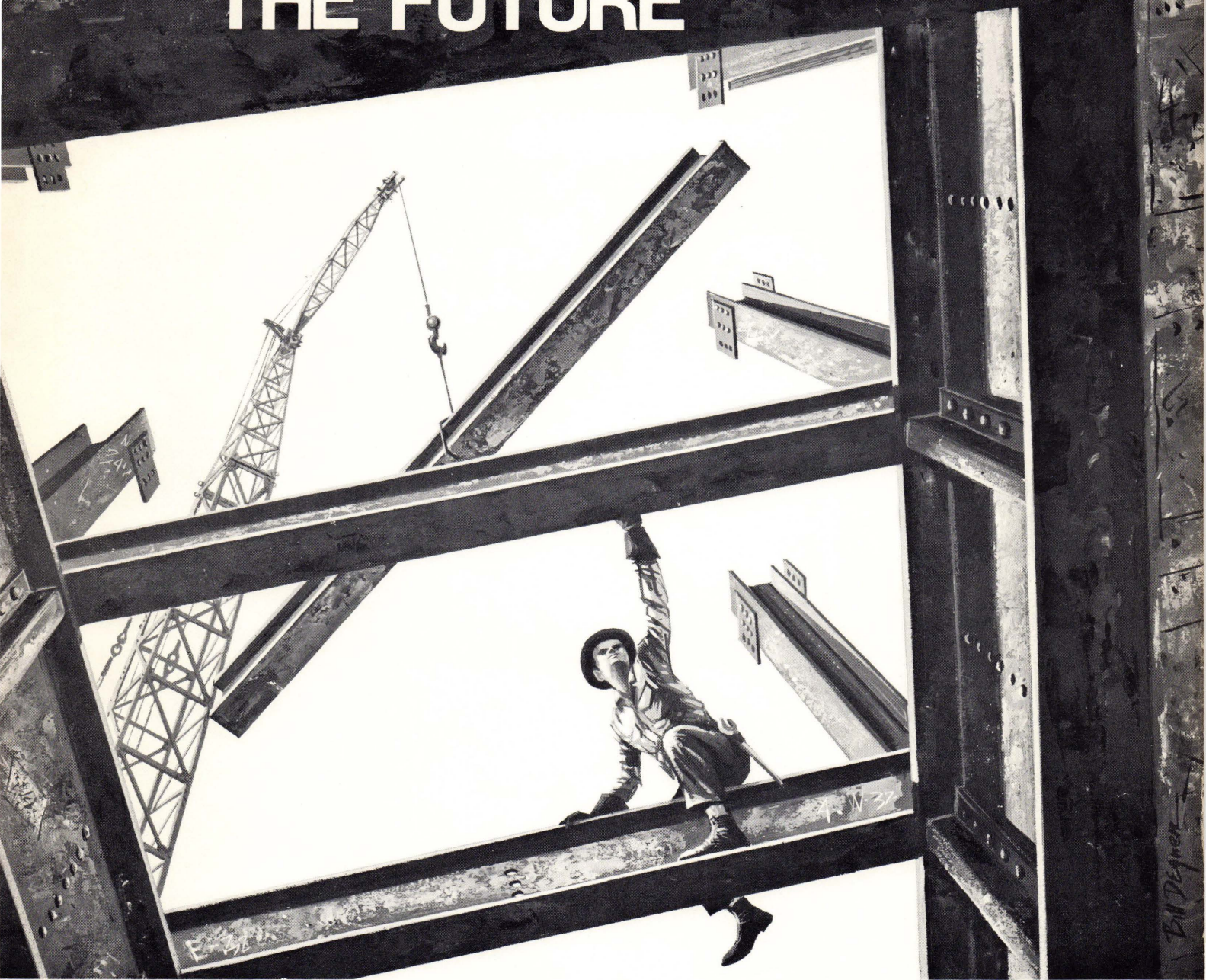
President Donald C. Rodner
Vice-President Raymond J. Wendel
Treasurer Harry A. Richardson, Jr.
Assistant Treasurer Frank E. Gibson

DIRECTORS

Robert T. Armistead, Sr.
John G. Carr, Jr.
Clifford L. Elling
Leonard W. Gibson

Vincent B. Hindley
James A. Moore
Robert L. Sanders
Eugene J. Stano

STEEL...FRAMEWORK FOR THE FUTURE



LET STEEL WORK FOR YOU!

There's little doubt that steel ranks second to none as an all-around construction material . . . one so versatile, durable and strong that no other medium even approaches its capacity on a pound for pound or square foot basis. Steel offers the architect and construction engineer unlimited design latitude . . . freedom to depart from the ordinary. No job is too big or too small. Steel enhances design potential, while continuing to provide the framework for inspired contemporary construction, as it has for the past 50 years.

But what of the men who translate the skill and vision of the architect and designer into living dimension . . . who employ years of knowhow to fabricate and erect

today's cities and tomorrow's skylines from the mightiest metal of them all?

The Structural Steel and Ornamental Iron Association of New Jersey, is interested in sharing its technology and experience with steel firms in the industry and with the architectural field in building for the future. With a free exchange of ideas and the ability to discuss better ways to do things, the structural steel industry and the architectural profession can better serve the public.

All steel firms, architects and engineers who are interested in receiving a brochure about the Structural Steel & Ornamental Iron Association of New Jersey, Inc. may do so by writing to the S. S. and O. I. A. of N. J., 11 Cleveland Pl., Springfield, N.J. 07081.

STRUCTURAL STEEL AND ORNAMENTAL IRON INDUSTRY OF NEW JERSEY

11 Cleveland Place, Springfield, N.J. 07081 201/467-1625

Mr. Architect:

AL

ARCHITECT HUGH N. ROMBERG & ASSOCIATES

224 ROCK RD.

HAWTHORNE, N.J. 07030

**THIS COULD BE THE
MOST IMPORTANT PRODUCT
IN YOUR SPECIFICATIONS**



CON-LUX

Coatings, Inc., Edison, N. J. 08817